UNITED STATES PATENT AND TRADEMARK OFFICE

APPLICATION NO.	FILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.	CONFIRMATION NO.
09/527,247	03/17/2000	W. Clinton Petty	068223/0147	3220

7590   10/03/2002

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EXAMINER
MOFIZ, APU M

ART UNIT	PAPER NUMBER
2175	

DATE MAILED: 10/03/2002

Please find below and/or attached an Office communication concerning this application or proceeding.

PTO-90C (Rev. 07-01)

-- The MAILING DATE of this communication appears on the cover sheet with the correspondence address --

Period for Reply

A SHORTENED STATUTORY PERIOD FOR REPLY IS SET TO EXPIRE <u>3</u> MONTH(S) FROM THE MAILING DATE OF THIS COMMUNICATION.

- Extensions of time may be available under the provisions of 37 CFR 1.136(a). In no event, however, may a reply be timely filed after SIX (6) MONTHS from the mailing date of this communication.
- If the period for reply specified above is less than thirty (30) days, a reply within the statutory minimum of thirty (30) days will be considered timely.
- If NO period for reply is specified above, the maximum statutory period will apply and will expire SIX (6) MONTHS from the mailing date of this communication.
- Failure to reply within the set or extended period for reply will, by statute, cause the application to become ABANDONED (35 U.S.C. § 133).
- Any reply received by the Office later than three months after the mailing date of this communication, even if timely filed, may reduce any earned patent term adjustment. See 37 CFR 1.704(b).

Status

1)☒ Responsive to communication(s) filed on *the amendment was filed on 09/10/2002* .

2a)☐ This action is **FINAL**.   2b)☒ This action is non-final.

3)☐ Since this application is in condition for allowance except for formal matters, prosecution as to the merits is closed in accordance with the practice under *Ex parte Quayle*, 1935 C.D. 11, 453 O.G. 213.

Disposition of Claims

4)☒ Claim(s) *1-21* is/are pending in the application.

    4a) Of the above claim(s) _____ is/are withdrawn from consideration.

5)☐ Claim(s) _____ is/are allowed.

6)☒ Claim(s) *1-21* is/are rejected.

7)☐ Claim(s) _____ is/are objected to.

8)☐ Claim(s) _____ are subject to restriction and/or election requirement.

Application Papers

9)☐ The specification is objected to by the Examiner.

10)☐ The drawing(s) filed on _____ is/are: a)☐ accepted or b)☐ objected to by the Examiner.

    Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a).

11)☐ The proposed drawing correction filed on _____ is: a)☐ approved b)☐ disapproved by the Examiner.

    If approved, corrected drawings are required in reply to this Office action.

12)☐ The oath or declaration is objected to by the Examiner.

Priority under 35 U.S.C. §§ 119 and 120

13)☐ Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).

    a)☐ All b)☐ Some * c)☐ None of:

      1.☐ Certified copies of the priority documents have been received.

      2.☐ Certified copies of the priority documents have been received in Application No. _____ .

      3.☐ Copies of the certified copies of the priority documents have been received in this National Stage application from the International Bureau (PCT Rule 17.2(a)).

    * See the attached detailed Office action for a list of the certified copies not received.

14)☐ Acknowledgment is made of a claim for domestic priority under 35 U.S.C. § 119(e) (to a provisional application).

    a) ☐ The translation of the foreign language provisional application has been received.

15)☐ Acknowledgment is made of a claim for domestic priority under 35 U.S.C. §§ 120 and/or 121.

Attachment(s)

1)☒ Notice of References Cited (PTO-892)

2)☐ Notice of Draftsperson's Patent Drawing Review (PTO-948)

3)☐ Information Disclosure Statement(s) (PTO-1449) Paper No(s) _____ .

4)☐ Interview Summary (PTO-413) Paper No(s). _____ .

5)☐ Notice of Informal Patent Application (PTO-152)

6)☐ Other: .

DETAILED ACTION

1.   Applicant's arguments filed September 10, 2002 with respect to claims 1-38 have

been considered but are moot in view of the new ground(s) of rejection.

Claim Rejections - 35 USC § 103

2.   The following is a quotation of 35 U.S.C. 103(a) which forms the basis for all

obviousness rejections set forth in this Office action:

> (a) A patent may not be obtained though the invention is not identically disclosed or described as set
> forth in section 102 of this title, if the differences between the subject matter sought to be patented and
> the prior art are such that the subject matter as a whole would have been obvious at the time the
> invention was made to a person having ordinary skill in the art to which said subject matter pertains.
> Patentability shall not be negatived by the manner in which the invention was made.

3.   Claims 1-21 are rejected under 35 U.S.C. 103(a) as being unpatentable over

Colyer (U.S. Patent No. 6,023,722) in view of Allison et al. (U.S. Patent No. 6,167,032

and Allison hereinafter).

        As to claims 1,6,10 and 14, Colyer teaches setting a high threshold of a depth of

the queue to a first value (see Fig.1, Fig.2, Fig.3; col 4, lines 15-37;col 7, lines 19-31);

detecting when the depth of the queue equals or exceeds the high threshold (see Fig.1,

Fig.2, Fig.3; col 4, lines 15-37;col 7, lines 19-31).

        Colyer does not teach raising the high threshold by a predetermined increment

each time the depth of the queue equals or exceeds the high threshold.

        Allison teaches raising the high threshold (i.e. transmit threshold) by a

predetermined increment each time the depth of the queue (i.e. the number of blocks to

be transmitted in the frame (i.e. queue/FIFO structure) from the host system) equals or

exceeds the high threshold (col 3, lines 1-35).

It would have been obvious to a person of ordinary skill in the art at the time of

Applicant's invention to modify the teachings of Colyer with the teachings of Allison to

include raising the high threshold by a predetermined increment each time the depth of

the queue equals or exceeds the high threshold with the motivation to maximize the

network's performance (Allison, col 3, lines 25-30).

As to claims 2,7,11 and 15, Colyer teaches starting at least one task for

processing one or more messages stored in the queue each time the depth of the

queue equals or exceeds the high threshold (col 7, lines 19-31).

As to claims 3,8,12 and 16, Colyer teaches starting at least one task for

processing one or more messages stored in the queue each time the depth of the

queue equals or exceeds the high threshold if the number of tasks currently processing

the messages in the queue is less than a predetermined amount (col 7, lines 19-31).

As to claims 4,9,13 and 17, Colyer does not teach setting a low threshold of the

depth of the queue to a value lower than the value of the high threshold and reducing

the value of the high threshold if the depth of the queue is equal to or less than the

value of the low threshold.

Allison teaches setting a low threshold of the depth of the queue to a value lower than the value of the high threshold (i.e. the transmit threshold is lowered or optimized) (col 3, lines 1-35) and reducing the value of the high threshold if the depth of the queue is equal to or less than the value of the low threshold (i.e. the transmit threshold is lowered or optimized) (col 3, lines 1-35).

It would have been obvious to a person of ordinary skill in the art at the time of Applicant's invention to modify the teachings of Colyer with the teachings of Allison to include setting a low threshold of the depth of the queue to a value lower than the value of the high threshold and reducing the value of the high threshold if the depth of the queue is equal to or less than the value of the low threshold with the motivation to maximize the network's performance (Allison, col 3, lines 25-30).

As to claims 18-21, Colyer teaches stopping at least one task for processing one or more messages stored in the queue if the depth of the queue is equal to or less than the value of the low threshold (col 7, lines 19-31).

Points of Contact

4.   Any inquiry concerning this communication or earlier communications from the examiner should be directed to Apu M. Mofiz whose telephone number is (703) 605-4240. The examiner can normally be reached on Monday – Thursday 8:00 A.M. to 4:30 P.M.

If attempts to reach the examiner by telephone are unsuccessful, the examiner's

supervisor, Dov Popovici can be reached at (703) 305-3830. The fax numbers for the

group is (703) 746-7239.

Any inquiry of a general nature or relating to the status of this application should

be directed to the Group receptionist whose telephone number is (703) 305-9600.

Apu M. Mofiz
Patent Examiner
Art Unit 2175

September 25, 2002

DIANE D. MIZRAHI
PRIMARY PATENT EXAMINER
TECHNOLOGY CENTER 2100